a common electrode having a function of a black matrix over said first interlayer insulating film;

a second interlayer insulating film over said common electrode:

a pixel line and at least one pixel electrode both formed over the second interlayer insulating film, said pixel electrode extending from said pixel line; and

a liquid crystal layer over said pixel line and said pixel electrode;

wherein said pixel electrode is electrically connected to the thin film transistor through said pixel line;

wherein said liquid crystal layer is driven by an electric field formed between said pixel electrode and said common electrode, said electric field having a component parallel with said substrate; and

wherein a storage capacitor is formed between said pixel line and said black matrix.

- 139. A device according to claim 138, wherein said pixel electrode has a width in a range of 0.1 to 2.0 μm .
- 140. A device according to claim 138, wherein said second interlayer insulating film comprises at least an organic resin material and an inorganic material and has a relative

dielectric constant larger than that of said first interlayer insulating film.



- 141. A device according to claim 138, wherein said second interlayer insulating film comprises one or a plurality of materials selected from the group consisting of AIN, AIN_xO_y , Si_3N_4 , and SiO_xN_y .
- 142. A device according to claim 138, wherein said thin film transistor has a semiconductor layer including a high-resistivity region.
- 143. A device according to claim 138, wherein said first interlayer insulating film has a thickness in a range of 0.1 to 5.0 μ m, and wherein said second interlayer insulating film has a thickness in a range of 0.01 to 1.0 μ m.
- 144. A device according to claim 138, wherein said thin film transistor has a semiconductor layer that is separated into a base region and a floating island region.
- 145. A device according to claim 138, wherein said first interlayer insulating film serves as a planarization film.

- 146. A liquid crystal display device comprising: a first substrate;
 - a second substrate opposed to said first substrate;
 - a thin film transistor over said first substrate;
- a first interlayer insulating over said thin film transistor:
- a common electrode having a function of a black matrix over said first interlayer insulating;
- a second interlayer insulating over said common electrode;
- a pixel line and at least one pixel electrode both formed over said second interlayer insulating film, said pixel electrode extending from said pixel line over said second interlayer film; and
- a liquid crystal layer over said pixel line and said pixel electrode;

wherein said pixel electrode is electrically connected to the thin film transistor through said pixel line;

wherein said liquid crystal layer is driven by an electric field formed between the pixel electrode and the common electrode, the electric field having a component parallel with said first substrate; and

wherein a storage capacitor is formed between said pixel line and said black matrix.

147. A device according to claim 146, wherein said pixel electrode has a width in a range of 0.1 to 2.0 μm .



- 148. A device according to claim 146, wherein said second interlayer insulating film comprises at least an organic resin material and an inorganic material and has a relative dielectric constant larger than that of said first interlayer insulating.
- 149. A device according to claim 146, wherein said second interlayer insulating film comprises one or a plurality of materials selected from the group consisting of AIN, AIN_xO_y , Si_3N_4 , and SiO_xN_y .
- 150. A device according to claim 146, wherein said first interlayer insulating film has a thickness in a range of 0.1 to 5.0 μ m, and wherein said second interlayer insulating film has a thickness in a range of 0.01 to 1.0 μ m.
- 151. A device according to claim 146, wherein said thin film transistor has a semiconductor layer that is separated into a base region and a floating island region.

- 152. A device according to claim 146, wherein said first interlayer insulating film serves as a planarization film.
 - 153. A liquid crystal display device comprising:
 - a substrate;
 - a thin film transistor over said substrate;
- a first interlayer insulating film comprising an organic resin over said thin film transistor;
- a common electrode having a function of a black matrix over said first interlayer insulating film;
- a second interlayer insulating film over said common electrode:
- a pixel line and at least one pixel electrode both formed over said second interlayer insulating film, said pixel electrode extending from said pixel line; and
- a liquid crystal layer over said pixel line and said pixel electrode;

wherein said pixel electrode is electrically connected to the thin film transistor through said pixel line;

wherein said liquid crystal layer is driven by an electric field formed between said pixel electrode and said common electrode, said electric field having a component parallel with said substrate; and



wherein a storage capacitor is formed between said pixel line and said black matrix.

154. A device according to claim 153, wherein said pixel electrode has a width in a range of 0.1 to 2.0 μm .



- 155. A device according to claim 153, wherein said second interlayer insulating film comprises at least an organic resin material and an inorganic material and has a relative dielectric constant larger than that of said first interlayer insulating film.
- 156. A device according to claim 153 wherein said second interlayer insulating film comprises one or a plurality of materials selected from the group consisting of AIN, $\text{AIN}_{x}\text{O}_{y}$, $\text{Si}_{3}\text{N}_{4}$, and SiO_xN_y .
- 157. A device according to claim 153, wherein said first interlayer insulating film has a thickness in a range of 0.1 to 5.0 $\mu\text{m}\text{,}$ and wherein said second interlayer insulating film has a thickness in a range of 0.01 to 1.0 μm .

- 158. A device according to claim 153, wherein said thin film transistor has a semiconductor layer that is separated into a base region and a floating island region.
- 159. A device according to claim 153, wherein said first interlayer insulating film serves as a planarization film.
 - 160. A liquid crystal display device comprising:
 - a substrate;
 - a thin film transistor over said substrate;
- a first interlayer insulating film over said thin film transistor;
- a common electrode having a function of a black matrix over said first interlayer insulating film;
- a second interlayer insulating film over said common electrode, said second interlayer insulating film comprising at least a first layer comprising an organic resin material and a second layer comprising an inorganic material;
- a pixel line and at least one pixel electrode both formed over said second interlayer insulating film, said pixel electrode extending from said pixel line; and
- a liquid crystal layer over said pixel line and said pixel electrode;

wherein said pixel electrode is electrically connected to the thin film transistor through said pixel line;

wherein said liquid crystal layer is driven by an electric field formed between said pixel electrode and said common electrode, said electric field having a component parallel with said substrate; and

wherein a storage capacitor is formed between said pixel line and said black matrix.



- 161. A device according to claim 160, wherein said pixel electrode has a width in a range of 0.1 to 2.0 μm .
- 162. A device according to claim 160, wherein said second layer of the second interlayer insulating film comprises one or a plurality of materials selected from the group consisting of AIN, AIN_xO_y , Si_3N_4 , and SiO_xN_y .
- 163. A device according to claim 160, wherein said first interlayer insulating film has a thickness in a range of 0.1 to 5.0 μm , and wherein said second interlayer insulating film has a thickness in a range of 0.01 to 1.0 μm .

FISH & RICHARDSON P.C.

164. A device according to claim 160, wherein said thin film transistor has a semiconductor layer that is separated into a base region and a floating island region.

